



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER OF PATENTS AND TRADEMARKS Washington, D.C. 20231 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO
09/443,202	11/18/1999	GREGORY DAVID DOOLITTLE	EN999058	6901
75	90 06/05/2002			
BLANCHE & SCHILLER ESQ HESLIN & ROTHENBERG PC 5 COLUMBIA CIRCLE		EXAMINER		
			WILLETT, STEPHAN F	
ALBANY, NY	122035160		ART UNIT	PAPER NUMBER
			2152	
			DATE MAILED: 06/05/2002	

Please find below and/or attached an Office communication concerning this application or proceeding.





· Office Action Summary

Application No. 09/443,202

Applicant(s)

Doolittle et al.

Examiner

Stephan Willett

Art Unit 2152



	The MAILING DATE of this communication appears on the cover sheet with the correspondence address				
Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION. Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the					
mailing - If the p - If NO p - Failure - Any rej	date of this communication. eriod for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely. eriod for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). bly received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any patent term adjustment. See 37 CFR 1.704(b).				
Status					
1) 💢	Responsive to communication(s) filed on Nov 18, 1999				
2a) 🗌	This action is FINAL . 2b) \(\overline{\times} \) This action is non-final.				
3) 🗌	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11; 453 O.G. 213.				
Disposit	ion of Claims				
4) 💢	Claim(s) 1-83 is/are pending in the application. 67,70 \$80-\$3				
4	a) Of the above, claim(s) 5-8, 12, 13, 23-26, 31-34, 38, 39, 49-52, 57, 62-65 s/are withdrawn from consideration.				
5) 🗆	Claim(s) is/are allowed.				
6) 💢	Claim(s) 1-4, 9-11, 14-22, 27-30, 35-37, 40-48, 53-56, 58-61, 66-68, and 71-79 is/are rejected.				
7) 🗆	Claim(s) is/are objected to.				
8) 🗆	Claims are subject to restriction and/or election requirement.				
Applica	tion Papers				
9) 🗆	The specification is objected to by the Examiner.				
10)	The drawing(s) filed on is/are a) accepted or b) objected to by the Examiner.				
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).				
11)	The proposed drawing correction filed on is: a) _ approved b) _ disapproved by the Examiner.				
	If approved, corrected drawings are required in reply to this Office action.				
12)	The oath or declaration is objected to by the Examiner.				
Priority	under 35 U.S.C. §§ 119 and 120				
13)□	Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).				
a) 🗆	All b) Some* c) None of:				
	1. Certified copies of the priority documents have been received.				
	2. Certified copies of the priority documents have been received in Application No				
	3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).				
_	ee the attached detailed Office action for a list of the certified copies not received.				
_	Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).				
	The translation of the foreign language provisional application has been received. Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.				
Attachm					
_	tice of References Cited (PTO-892) 4) Interview Summary (PTO-413) Paper No(s)				
	2) X Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) Notice of Informal Patent Application (PTO-152)				
3) X Information Disclosure Statement(s) (PTO-1449) Paper No(s). 2 6) Other:					

Page 2

Application/Control Number: 09/443,202

DETAILED ACTION

Election/Restriction

- 1. Restriction to one of the following inventions is required under 35 U.S.C. 121:
 - I. Claims 1-4, 9-11, 14-22, 27-30, 35-37, 40-48, 53-56, 58-61, 66-68 and 71-79,drawn to altering thread pools, are classified in class 709, subclass 201.
 - II. Claims 5-8, 12-13, 23-26, 31-34, 38-39, 49-52, 57, 62-65, 69-70 and 80-83,drawn to selecting a thread pool, are classified in class 709, subclass 242.
- 2. The inventions are distinct, each from the other because: The claims in Group I involve steps to determine an alternate thread pool, while the claims in Group II specifically involve selecting a thread pool, which is classified in a different class from Group I.
- Inventions I and II are related as combination and subcombination. Inventions in this relationship are distinct if it can be shown that (1) the combination as claimed does not require the particulars of the subcombination as claimed for patentability, and (2) that the subcombination has utility by itself or in other combinations (MPEP § 806.05(c)). In the instant case, the combination as claimed in Group II does not require the particulars of the subcombination as claimed in Group I because the particular step of selecting which thread pool is desired in the claims in Group II are not required to determine an alternative thread pool as described in the claims in Group I. The steps to determine an alternative thread pool is an independent method that is not required for the claims in Group II to be utilized. The subcombination has separate utility in itself in that the process to determine an alternative thread pool as described in the claims in Group I, can be used in other applications.

- 4. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, restriction for examination purposes as indicated is proper.
- 5. Because these inventions are distinct for the reasons given above and the searches required for Group I is not required for Group II, restriction for examination purposes as indicated is proper.
- 6. Applicant is advised that the reply to this requirement to be complete must include an election of the invention to be examined even though the requirement be traversed (37 CFR 1.143).
- 7. Applicant's election with traverse of claims 1-4, 9-11, 14-22, 27-30, 35-37, 40-48, 53-56, 58-61, 66-68 and 71-79 by Blanche Schiller by telephone on May 15, 2002 is acknowledged.

Title Change

8. Pursuant to MPEP 606.01, the title should be changed to provide a complete and detailed description of the invention.

Claim Rejections - 35 USC § 103

9. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any

Application/Control Number: 09/443,202

Page 4

evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103© and potential 35 U.S.C. 102(f) or (g) prior art under 35 U.S.C. 103(a).

- 10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 11. Claims 1-4, 9-11, 14-22, 27-30, 35-37, 40-48, 53-56, 58-61, 66-68 and 71-79 are rejected under 35 U.S.C. 103(a) as being unpatentable over Brobst et al. with Patent Number 6,125,382 in view of Schoening et al. with Patent Number 6,205,465.
- 12. Regarding claim(s) 1, 27, 53, 58, Brobst teaches a manipulation of threads within a computer network. Brobst teaches *receiving a 1st request* as "object A", col. 6, lines 1-3. Brobst teaches *the 1st request waiting for a response from a 2nd request* [object B], col. 7, lines 39-40. Brobst teaches *selecting from a thread pool*, col. 7, lines 14-16. Brobst teaches *altering eligible thread pools*, col. 10, lines 17-21, 32-39. Brobst teaches the invention in the above claim(s) except for explicitly teaching *altering existing thread pools to serve a request*. In that Brobst operates to generate multiple threads the artisan would have looked to the networking arts for details of implementing thread allocation. In that art, Schoening, a related network thread adapter, teaches "the function must often wait while the external devices complete some other function", col. 39-40, lines 66-1 in order to process a request. Schoening, specifically teaches "the timeBase providing the partial order of Service Module Functions needed to effectuate the

Application/Control Number: 09/443,202

Page 5

needed services is selected", col. 42, lines 22-24 and col. 41, lines 39-42. Determining different thread groups or process configurations to complete a request is taught. Further, Schoening suggests that "the ANI has a mechanism providing dynamic determination of the execution sequence of processes", col. 22, lines 45-47 which will result from implementing his thread groupings. The motivation to incorporate thread groupings insures that deadlocks among other delays are overcome. Thus, it would have been obvious to one of ordinary skill in the art to incorporate the grouping of threads as taught in Schoening into the network described in the Brobst patent because Brobst operates with threads and Schoening suggests that optimization can be obtained by manipulating thread configurations. Therefore, by the above rational, the above claim(s) are rejected.

- 13. Regarding claims 2-3, 28-29, 59-60, Schoening teaches *masking thread pools*, col. 41, lines 1-5. Thus, the above claim limitations are obvious in view of the combination.
- 14. Regarding claims 4, 30, 61, Brobst teaches *alter processing when a wait state is* recognized, col. 12, lines 57-58. Thus, the above claim limitations are obvious in view of the combination.
- 15. Regarding claims 9, 35, 66, Schoening teaches *altering thread groups for other parallel processes*, col. 40, lines 36-38. Thus, the above claim limitations are obvious in view of the combination.
- 16. Regarding claims 10-11, 36-37, 67-68, Schoening teaches *thread pools based on call backs*, col. 15, lines 46-48 and col. 16, lines 7-8. Thus, the above claim limitations are obvious in view of the combination.
- 17. Regarding claims 14-15, 18, 40-41, 44, 54, 71-72, 75, Brobst teaches requests at servers,

Application/Control Number: 09/443,202 Page 6

col. 6, lines 7-11. Thus, the above claim limitations are obvious in view of the combination.

- 18. Regarding claims 16-17, 42-43, 73-74, Brobst teaches *client on the same or different computer*, col. 14, lines 26-28. Thus, the above claim limitations are obvious in view of the combination.
- 19. Regarding claims 19, 45, 76, Brobst teaches *avoiding deadlocks*, col. 7, lines 37-40. Thus, the above claim limitations are obvious in view of the combination.
- 20. Regarding claims 20, 46, 77, Schoening teaches *ingoring input froma 2nd requister*, col. 40, lines 65-67. Thus, the above claim limitations are obvious in view of the combination.
- 21. Regarding claims 21-22, 47-48, 55-56, 78-79, Brobst teaches *the same or different* requesters, col. 15, lines 4-7. Thus, the above claim limitations are obvious in view of the combination.

Conclusion

- 22. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure is disclosed in the Notice of References Cited.
- 23. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephan Willett whose telephone number is (703) 308-5230. The examiner can normally be reached Monday through Friday from 8:00 AM to 6:00 PM.
- 24. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Rinehart, can be reached on (703) 305-4815. The fax phone number for the organization where this application or proceeding is assigned is (703) 308-6606.
- 25. Any inquiry of a general nature or relating to the status of this application or proceeding

Application/Control Number: 09/443,202

Page 7

should be directed to the receptionist whose telephone number is (703) 305-9605...

sfw

May 21, 2002

LE HIEN LUU PRIMARY EXAMINER